

The mission of the NINR is to support basic and clinical research to establish a scientific basis for the care of individuals across the life span. Research activities supported by the NINR are singularly patient-oriented; even basic research supported and conducted by the Institute seeks to tackle questions that are at the heart of patients' and families' daily experiences with illness.

Nurse researchers are the scientific vanguard of the largest profession in the health-care delivery system. With nursing recognized today as a direct, indispensable link between clinical research and front-line patient care, one of the aims of nursing research is to ensure that knowledge about health-enhancing and life-saving therapies is translated into effective health-care services and becomes an integral part of people's lives. The activities of the NINR are key to the dissemination and utilization of new scientific discoveries.

Because the NINR's research portfolio is not specific to any given disease or condition, the Institute interacts with virtually all components of the NIH, contributing both the scientific expertise of nurse researchers and the insights of a clinical profession.

Areas of Scientific Opportunity for FY 2001

Managing Chronic Illness. Although chronic conditions, such as cardiovascular disease, cancer, arthritis, and diabetes, can occur at any age, they more often affect older adults, whose numbers are expected to increase dramatically in the coming years. More people are living longer, but not necessarily better. Chronic diseases currently affect almost 100 million people, costing the U.S. economy \$470 billion in direct medical costs and over \$230 billion in lost productivity. At least one-fourth of American families provide unpaid, informal care for an older friend or relative who may have more than one chronic illness.

NINR research includes management of the symptoms of chronic illness, providing skills training and support for family caregivers, and developing prevention interventions. Special emphasis is given to strategies to help patients monitor and manage their own chronic conditions over the long term. Components of these strategies will include problem solving techniques, adherence to healthy lifestyles, and improving quality of life.

Health Disparities -- Closing the Gaps. NINR research addresses how to promote good health and alleviate health disadvantages among minority ethnic and cultural populations. Research is advancing positive change in areas such as low birthweight and diabetes, where there is a significant difference in incidence and prevalence rates among certain minority groups. NINR's emphases include prevention, reduction of the symptoms of illness, adherence to treatments, self-management of illness, and improvement of quality of life. Special attention will be directed at diabetes among different ethnic minority groups, including the influence on self-management of diabetes of genetics, diet, physical activity, education, poverty, the environment, social support and coping skills.

Improving Palliative Care at the End of Life. Americans report concern about quality of life for the terminally ill, particularly when they face decisions about technological advances that extend life's duration, but not necessarily life's quality. Concerns include progressive incapacitation, reliance on life-sustaining technology, loss of autonomy, and severe discomfort, including pain.

End of life research is a relatively new area of scientific investigation. As coordinator for end-of-life research at the NIH, NINR encourages scientific research to improve clinical management of symptoms associated with terminal illnesses. NINR also supports research that focuses on bioethics, caregivers, healthcare disparities, and decision-making that emphasizes individual autonomy and dignity.

Telehealth. Telehealth technology is important to extend the reach of clinical research and

practice by providing a long distance health care capability to underserved areas, including rural communities. NINR supports telehealth studies for treatment and monitoring of patients and for providing health information. Current and future studies will include determining the effects of telehealth on various patient populations and cost savings associated with telehealth projects. Research will target patients most likely to benefit from telehealth interventions, identify barriers, and find ways to integrate telehealth with other treatment and care regimens.

Examples of NINR-Supported Research

Cancer. It is now possible to predict which cancer patients are likely to experience nausea during chemotherapy and to prevent or ease this unpleasant side effect and improve adherence to the life-saving treatments.

Pain. Certain pain relievers for acute pain are more effective in women than in men. This underscores the importance of gender in considering analgesics for pain.

Feeding Tubes. An inexpensive bedside test equals costly X-rays in accurately determining incorrect insertion or dislocation of feeding tubes used to provide nutrition and fluids.

Pressure Ulcers. Patients at higher risk for pressure ulcers can be identified within a few days of admission to a health care institution so that early preventive action can be taken.

Cardiovascular Disease. A highly effective cardiovascular risk reduction program has been tested for grade-school children. This program educates the children about nutrition and

exercise in a way that is fun and easy to follow and helps them establish positive health habits.

End of Life. Families are often ready to minimize or eliminate aggressive treatments of their ill relatives in favor of high quality comfort care if families understand that the conditions are terminal.

Diabetes. Teens that typically have trouble controlling their diabetes are able to improve control after training in coping skills, particularly in difficult social situations.

Transitional Care from Hospital to Home. Higher health care quality at lower costs have resulted from use of a model of comprehensive discharge planning, involving older adults with common medical and surgical problems, with follow-up in the home by advanced practice nurses. Six months after discharge, patients had 48 percent fewer rehospitalizations, 54 percent fewer multiple hospital readmissions, and 65 percent fewer days in the hospital at a 48 percent cost savings to the health care system.

**National Institute of Nursing Research
Office of Science Policy and Public Liaison
31 Center Drive
Building 31, Room 5B10
Bethesda, MD 20892-2178**

**Phone: 301-496-0207
FAX: 301-480-8845
<http://www.nih.gov/ninr>**